1.   **Define and document software development process.**

Software Development Process defined for the following projects: MOS, AWIPS, LAMP, NDFD.   Valery Dagostaro is working on the Verification and Coastal Marine processes. First draft will be ready by the end of the month.

Each Branch Chief is reviewing their Software Development Process document. MOS project has completed the review of the draft process and changes have been made to the document.

Ed Mandel is preparing a MDL Software Development Approach document that will show a common software development approach for MDL with individual software development process tailored to each project (AWIPS, NDFD, LAMP, etc). A draft version will be ready by the end of this week.

Ed Mandel will establish a review cycle for the MDL Standards, Guidelines and Procedures. Paul Dallavalle has an action to review the current MDL FORTRAN standards.

2.   **Review development process and identify areas of improvement.**

MDL's Software Development Approach requires that each project shall periodically review their software development process for strengths and weaknesses. Lessons learned will be identified and utilized to improve future development efforts. This review will be performed yearly and will be used to update the projects software development process.

3.   **Educate developers about the process and expectations**

Once each branches software process documents are completed, training sessions will be conducted to review the software development process with developers. The software development process will be distributed to the developers prior to the review.

Each training session will include a review of the software development process and documentation. Branch Chiefs and Task Leads will highlight what we follow and where we could improve.

Ed Mandel has an action to set up software development process training sessions. The order will be MOS, AWIPS, LAMP, NDFD, and Verification. The first session will be tentatively scheduled for March 3, 2004.

Identify a software package to be provided to new employees when they begin work at MDL. This package would include standards, review guidelines, general breakdown of MDL's structure, etc.

4.   Establish procedures to monitor adherence to the software development process.

Once each branches software process documents are completed, each project will establish a Project Plan Tracking Sheet (staffing plan, schedule and development checklist). This sheet will be used to track schedule and adherence to the software development process. Ed Mandel has an action to prepare these sheets prior to the software development training in Item 3.

5.   Implement training programs for developers to raise the level of expertise.

The group is maintaining a list of training topics and assigned experts to each topic. Training sessions are now being scheduled.   Jim Lieu has an action to update the training schedule, have it reviewed by the team prior to distribution to the developers.   It will also be posted on the MDL Quality Assurance Advisory Committee Web Page.

Branch Chief's should remember that they need to allow trainers time to prepare and teach classes.

The group is establishing an MDL Software Development List Server and guidelines for using that server.   All developers are subscribed automatically and will use standard headings to identify their project. The QA team will review list server every two weeks and identify topics to be added to a Frequently Asked Questions (FAQ) page.

6.   Look for automated tools to reduce developer workloads

The QA group will kickoff a Tiger team to review and recommend one Software Development process for MOS, Verification and LAMP development. Initially, the group will look at CM tools and possible recommend a CM for use by MOS, Verification and LAMP.   The team will be formed and a meeting planned for February.

7.   Establish a web page for MDL Quality Assurance Advisory Committee

Draft website under review by QA Team

8.   Communication between Developers and System Administrators.

The QA team is concerned about the lines of communication between the System Administrators and developers. Methods need to be devised to establish better and effective communications.

The QA team will recommend a System Administrator Communication Guideline policy for the system administration staff to follow. Ed Mandel has an action to prepare a draft document.